

In the Claims:

Please cancel claims 7-12, without prejudice, and amend claims 13, 15 and 17.

The status of the claims is as follows:

1-12. (Canceled)

13. (Currently Amended) A signal processing method utilizing a partial response to record information on a medium and then regenerate the information from the medium, comprising:

subjecting a record signal recorded on the medium to a convolution of $(1-D)$ before a detecting process,

subjecting a regeneration signal from the medium to an equalizing process including the convolution of

$(k-s \cdot D)$

where D : one (1) bit delay operator, and

k, s : positive integer, ~~$k \neq s$~~ and

$k \geq 3, s \geq 2$.

14. (Previously Presented) The signal processing method according to claim 13, wherein the information is decoded from the equalized regeneration signal by use of maximum-likelihood detection.

15. (Currently Amended) A signal processing circuit utilizing a partial response to record and regenerate information on a medium comprising:

a signal recording regenerating system including,

a recording system subjecting a record signal recorded on the medium to the convolution of $(1-D)$ before a detecting process; and

a regenerating system subjecting a regeneration signal from the medium to an equalizing process including the convolution of

$(k-s \cdot D)$

where D : one (1) bit delay operator, ~~and~~

k, s : positive integer, ~~$k \neq s$~~ , and

$k \geq 3, s \geq 2$.

16. (Previously Presented) The signal processing circuit according to claim 15, wherein the information is decoded from the equalized signal by use of maximum-likelihood detection.

17. (Currently Amended) a signal recording/regenerating apparatus utilizing a partial response to record and regenerate information on a medium comprising:

a recording system subjecting a record signal recorded on the medium to the convolution of $(1-D)$ before a detecting process; and

a regenerating system subjecting a regeneration signal from the medium to an equalizing process including the convolution of

$(k-s \cdot D)$

where D : one (1) bit delay operator, ~~and~~

k, s : positive integer, ~~$k \neq s$~~ and

$k \geq 3, s \geq 2$.

18. (Previously Presented) The signal recording/regenerating apparatus according to claim 17, wherein the information is decoded from the equalized signal by use of maximum-likelihood detection.